



<b>Product(s):</b>	<b>Fabius GS</b>
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<b>Pages:</b>	<b>8</b>

## **Subject: Fabius GS Software Version 1.20 (Upgrade)**

The Fabius GS team is very excited to announce the official release of software version 1.20. Our new software was released on January 31, 2002 and will immediately be implemented in all new machines. As an exception, this software upgrade is available free of charge. Please schedule an appropriate timing for the upgrade since the BU will not cover any service charges for the implementation.

We are very happy about this SW since a lot of the new features were identified during our clinical trials. Thanks again to all of you who provided feedback and helped us in making Fabius GS a better and more competitive product.

To order Fabius GS SW Version 1.20 and a new Operator's Manual please contact your Customer Service Representative at DMI to place a no-charge sales order. Please select the appropriate language version of the updated Operator's Manual as well.

Fabius GS Operator's Manual – British – Part #4199917  
Fabius GS Operator's Manual – Spanish – Part #4199918  
Fabius GS Operator's Manual – German – Part #4199919  
Fabius GS Operator's Manual – French – Part #4199920

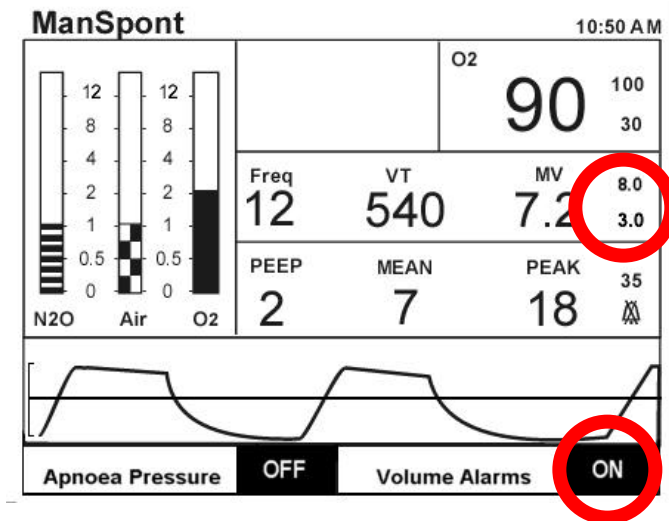
This document compares the old Fabius GS software 1.12 with our new software 1.20.

1. In 1.12 the acoustic confirmation feature accompanies the press of the rotary dial when a mode change is made.

In 1.20 the acoustic confirmation accompanies the press of the rotary dial any time that pressing the dial causes a change to the operator's displays.

2. In 1.12 switching the "Volume Alarm" to "On" or "Off" in Man/Spont mode is accomplished by indicating the next state of the alarm over the respective softkey. When the alarm is off the 'label' reads "On". When the alarm is on the label reads "Off"

In 1.20 the label over the softkey indicates the current state of the alarms. When the alarms are on the label will read "On". When the alarms are off the label will read "Off".

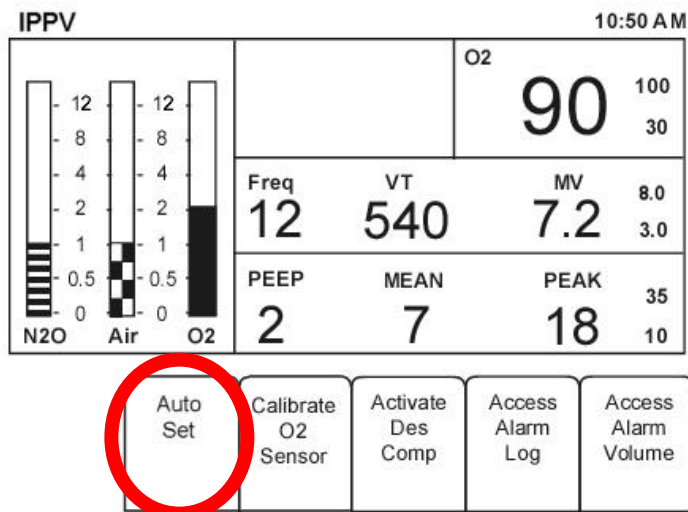


- In 1.12 completing an activity in the Volume, Pressure, or Man/Spont menu screens brings the display back to the menu screen.

In 1.20 completing any activity in the Volume, Pressure, or Man/Spont menu screens causes the screen to change back to the waveform display.

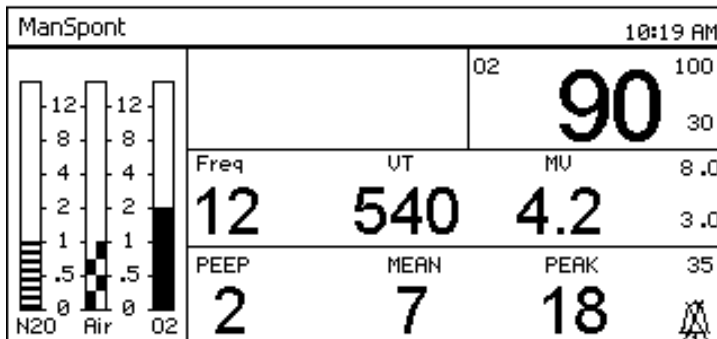
- In 1.12 there is no autoset feature for the breathing pressure threshold setting.

In 1.20 an autoset softkey is added to the Volume, Pressure, and Man/Spont menu screens. Pressing the softkey sets the threshold to four cmH2O below the current Peak pressure data value but the threshold setting may not be less than five or greater than thirty. In the absence of a current Peak pressure data value pressing the softkey will have no effect. A Threshold Low alarm is added with this change. Vitalink and Medibus outputs support this new feature.



- In 1.12 the Standby mode confirm screen message relating to turning off gasses is in a small font.

In 1.20 the message is in a more noticeable font.



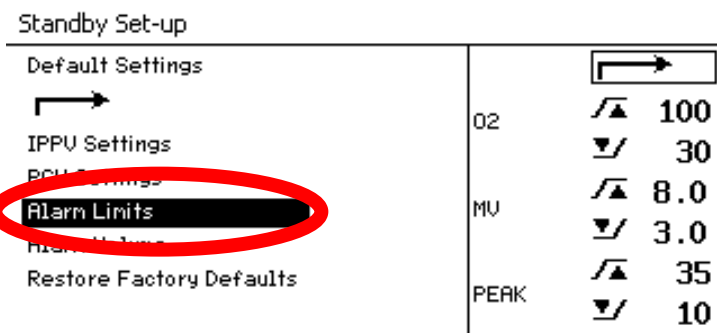
Press rotary knob to confirm Standby  
Shut off all gas flow control valves

6. In 1.12 the pump is always turned off while in Service mode real time screen.

In 1.20 there is a softkey switch in the real time display screen that allows the pump to be turned on and off. Any time this screen is exited the pump is turned off.

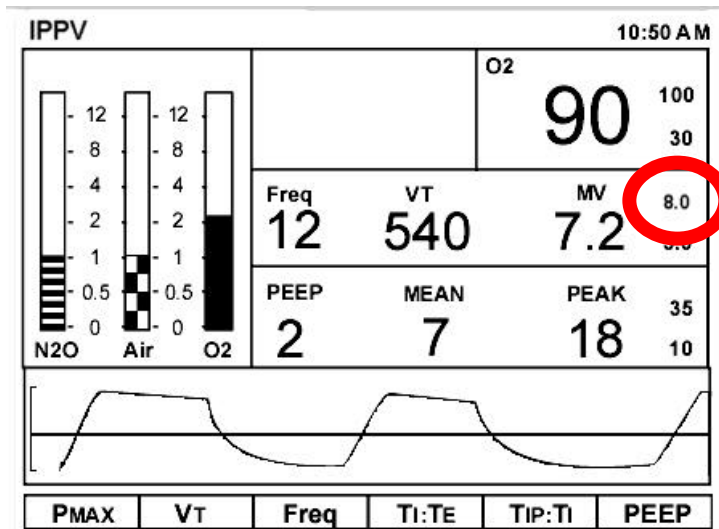
7. In 1.12 the Standby menu has an “Alarms” selection label under defaults.

In 1.20 this selection label is changed to “Alarm Limits”.



8. In 1.12 there is no Minute Volume high alarm.

In 1.20 there is a Minute Volume high alarm limit setting in the alarm limits screen, the alarm limits default screen, and in factory default settings. The range of this setting is 0.1 to 20.0 l/min but not less than the Minute Volume low alarm limit. When the high alarm limit is exceeded a medium priority alarm is annunciated. Vitalink output supports this new feature.

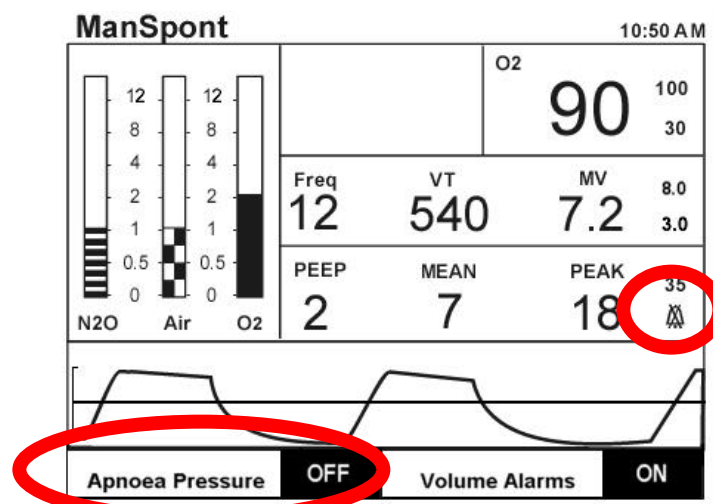


9. In 1.12 the current alarms and battery reserve status are not available via Test Mode.

In 1.20 Test Mode is able to read the current alarms and battery reserve status.

10. In 1.12 there is no provision for enabling the pressure apnea alarm while in Man/Spont.

In 1.20 there is a softkey similar to the volume alarms key to turn the "Pressure Apnea Alarm" on and off.

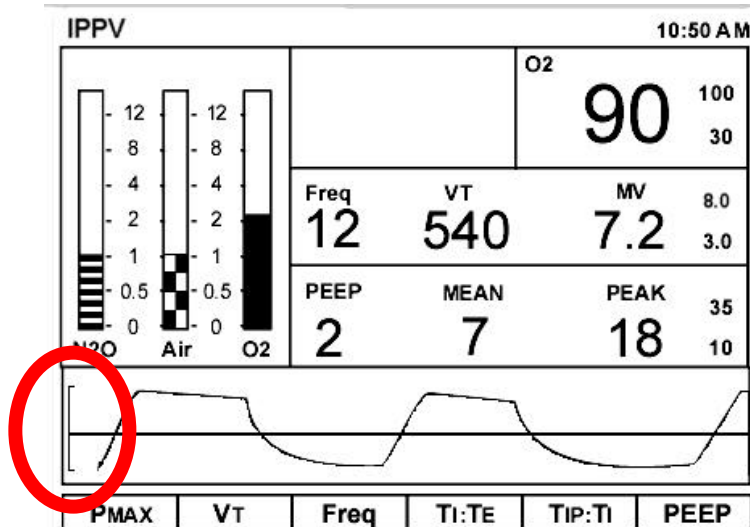


11. In 1.12 there are checks for air entrainment in Volume Mode, Pressure Mode, and during mode changes.

In 1.20 checks for air entrainment are also done in Man/Spont Mode.

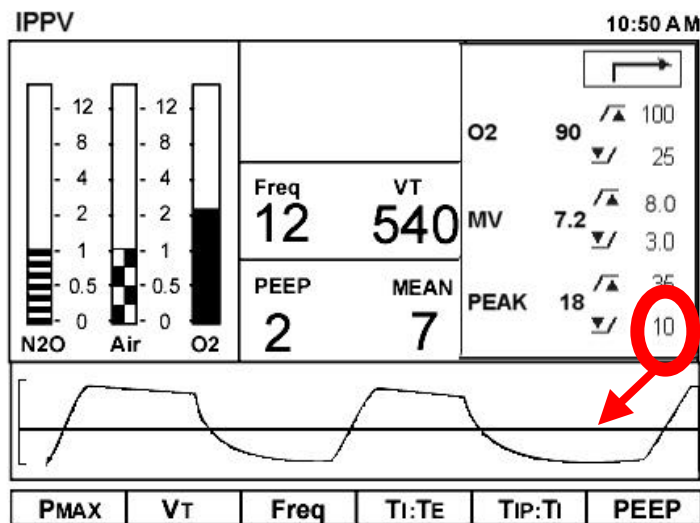
12. In 1.12 there is no indication of where the minimum and maximum vertical limits are for the active trace area of the pressure waveform.

In 1.20 there is an indicator that marks the minimum and maximum vertical limits for the pressure waveform.



13. In 1.12 the graphic threshold setting indicator does not change until a new numeric setting is confirmed.

In 1.20 the graphic threshold setting indicator changes as the numeric setting is changed. If the numeric setting is not confirmed, the graphic indicator reverts to the previously confirmed setting.



14. In 1.12 the requirement for the "O2 SUPPLY LOW" Alarm was not specific with regard to an existing silence period.

In 1.20 the "O2 Low Pressure Alarm" is audibly annunciated regardless of the state of audio silence.

➔ If a Fabius GS is configured (in the service screen) for the audible O2 low alarm (10 seconds), this alarm will sound even if the alarm silence button was activated.

15. In 1.12 screen changes could cause some flickering on the display.

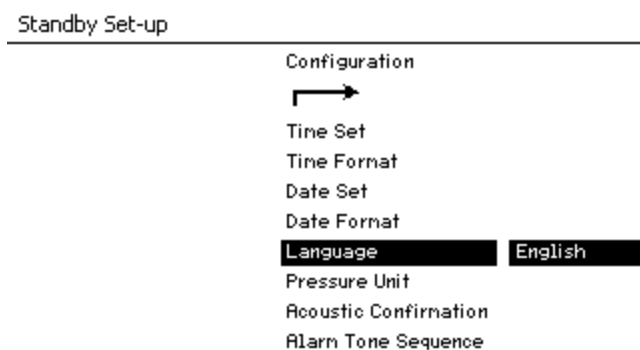
In 1.20 the screen flickering is eliminated.

16. In 1.12 the upward speed of the piston during an "Expiratory Flow Sensor Cal" can cause in excess of 10 cmH2O pressure with a neonatal breathing hose. The piston will stop at this pressure and not purge the flow sensor.

In 1.20 the upward speed has been reduced so that with a neonatal tube the pressure does not exceed 8 cmH2O. **The piston will STOP if 10 cmH2O is reached.**

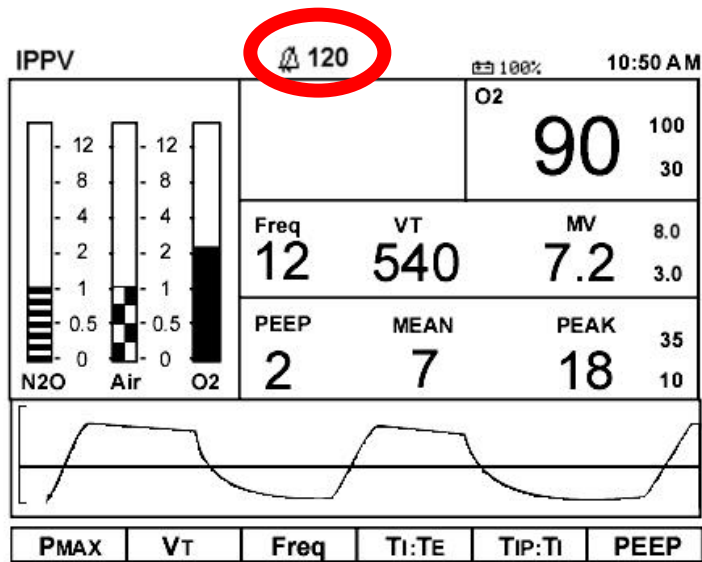
17. In 1.12 confirming a new language setting does not immediately change all the labels in the Standby menu screen.

In 1.20 confirming a new language immediately changes all the labels in the Standby Menu screen.



18. In 1.12 the audio silence counter does not count down to zero.

In 1.20 the audio silence counter counts down to zero



19. In 1.12 pulling the battery fuse, replacing it, and then disconnecting AC all in a short period of time causes an error in the reserve battery indicator.

In 1.20 the battery indicator recovers from this error.

20. In 1.12 the audio timeout feature does not get reset when going from an audio-required timeout screen to a no-audio timeout screen.

In 1.20 the audio timeout occurs only from screens that require audio.

21. In 1.12 there is no means to record the control unit PCB serial number.

In 1.20 test mode commands allow both the setting and reading of the PCB serial number.

22. In 1.12 the operator can always select the language and pressure units used on the screens.

In 1.20 a service screen option is added to select either a US or Non-US market kit. With the US market kit selected only English and cmH2O are used on the displays.

23. In 1.12 "EXP PORT LEAKAGE" can be posted at Peak pressure 4 cmH2O below the Pmax setting.

In 1.20 "EXP PORT LEAKAGE" can not be posted until the Peak pressure is 6 cmH2O below the Pmax setting.

24. In 1.12 the blanking/sweep bar in the pressure curve consumed more display area than needed.

In 1.20 the blanking/sweep bar is half as wide as in 1.12.

25. In 1.12 the "Fresh Gas Low" alarm hold time allowed the alarm to come and go on each breath.

In 1.20 the hold time is one breath plus 2 seconds.

26. In 1.12 the mode will not change from standby to Man/Spont if gas is turned on while the display is not in the standby home screen.

In 1.20 if the monitor is in standby mode (except for the leak test) the mode changes to Man/Spont whenever the gas flow changes from none to some. If the gas flow is changed from none to some and left flowing during the Leak Test, the switch to Man/Spont will occur at the end of the leak test.

27. In 1.12 if the screen is left in any Standby Screen except the Home Screen the mode will never change to sleep.

In 1.20 a '15 Minute Timer' is active for Standby Screens other than the Home Screen. If no activity occurs during 15 minutes, the screen will change to the Home screen and, if no gas is flowing, Sleep Mode will be activated after 5 minutes.

28. In 1.12 if the negative pressure relief valve failed to open the ventilator could pull pressures below -10 mbar.

In 1.20 checks of both the airway pressure and the ventilator pressure cause the ventilator to stop, the pump to stop, and the "VENTILATOR FAIL" Alarm to be posted when either pressure is less than or equal to -10 mbar. The ventilator and pump will resume operation and the alarm will be cleared when both pressures are greater than -2 mbar.

29. In 1.12 a large negative pressure applied to the airway pressure sensor would cause the calibration to go invalid.

In 1.20 a large negative pressure has no effect on the calibration of the airway pressure sensor.

If you have any questions please do not hesitate to contact Rainer Haehner in Luebeck (x4335) or Jens Boy in Telford (+215-721-5400 x2271).